Amendments to the Claims

This listing of claims will replace all prior versions and listings of the claims in the application.

Claims 1-99 (Cancelled).

--100. (Currently amended) A composition which comprises:

a) a conjugate ~~comprising~~ of (i) a GM2 or a GD2 ganglioside derivative, which derivative comprises an unaltered oligosaccharide part and an altered ceramide portion comprising an altered sphingosine base and (ii) a derivative of Keyhole Limpet Hemocyanin;

b) QS-21, a saponin derivable from the bark of a Quillaja saponaria Molina tree; and

c) a pharmaceutically acceptable carrier;

wherein the amount of the conjugated ganglioside derivative is an amount between about 1 µg and about 200 µg, the amount of the saponin is an amount of between about 10 µg and about 200 µg, and the GM2 or GD2:Keyhole Limpet Hemocyanin derivative molar ratio is from 200:1 to 1400:1, the relative amounts of such conjugate and such saponin being effective to stimulate or enhance production in a subject of an antibody to GM2 and GD2, whichever is present as a derivative in the conjugate,

wherein in the conjugate the ganglioside derivative is covalently bound to the derivative of Keyhole Limpet Hemocyanin through a C-4 carbon of the altered sphingosine base of the altered ceramide portion of the ganglioside derivative to an ε-aminolysyl group of Keyhole Limpet Hemocyanin, wherein the C-4 carbon is present in a CH_2 group.--

Claims 101-105 (Cancelled).

--106. (Currently amended) The composition of claim [[102]] 100 wherein the ganglioside derivative is a GM2 ganglioside derivative and wherein the amount of the ~~conjugate~~ conjugated GM2 ganglioside derivative is an amount of about 30 µg. --

--107. (Currently amended) The composition of claim [[102]] 100 wherein the ganglioside derivative is a GD2 ganglioside derivative and wherein the amount of the ~~conjugate~~ conjugated GD2 ganglioside derivative is an amount of about 70 µg. --

Claim 108 (Cancelled).

--109. (Currently amended) The composition of claim [[108]] 100 wherein the amount of the saponin is about 100 µg. --

--110. (Currently amended) The composition of claim [[108]] 100 wherein the amount of the saponin is about 200 µg. --

Claim 111 (Cancelled).

--112. (Currently amended) The [[A]] composition of claim 100 which comprises:

a) a conjugate ~~comprising~~ of (i) a GM2 or a GD2 ganglioside derivative, which derivative comprises an unaltered oligosaccharide part and an altered ceramide portion comprising an altered sphingosine base and (ii) a derivative of Keyhole Limpet Hemocyanin;

b) QS-21, a saponin derivable from the bark of a Quillaja saponaria Molina tree, ~~wherein the saponin is Qs-21~~; and

c) a pharmaceutically acceptable carrier;

wherein the conjugated ganglioside derivative is present in an amount between about ~~10 µg and about 50 µg~~ 1 µg and about 200 µg,

the amount of the saponin is about 100 µg and the GM2 or GD2:Keyhole Limpet Hemocyanin derivative molar ratio is from 200:1 to 1400:1, where the amount of such conjugate and such saponin is effective to stimulate or enhance production in a subject of an antibody to GM2 and GD2, whichever is present as a derivative in the conjugate;

and wherein in the conjugate the ganglioside derivative is covalently bound to the derivative of Keyhole Limpet Hemocyanin through a C-4 carbon of the altered sphingosine base of the altered ceramide portion of the ganglioside derivative to an ε-aminolysyl group of Keyhole Limpet Hemocyanin, wherein the C-4 carbon is present in a CH_2 group. --

--113. (Previously presented) A method of treating a subject afflicted with melanoma which comprises administering to said subject an amount of the composition of claim 112 effective to stimulate or enhance production of an antibody directed to at least one of GM2 and GD2 and to thereby treat said melanoma in said subject. --

--114. (Currently amended) A method of stimulating or enhancing production of an antibody directed to GM2 or GD2 in a subject which comprises administering to the subject an effective amount of a composition which comprises:

a) a conjugate ~~comprising~~ of (i) a GM2 or a GD2 ganglioside derivative, which derivative comprises an unaltered oligosaccharide part and an altered ceramide portion comprising an altered sphingosine base and (ii) a derivative of Keyhole Limpet Hemocyanin;

b) QS-21, a saponin derivable from the bark of a Quillaja saponaria Molina tree; and

c) a pharmaceutically acceptable carrier;

wherein the amount of the conjugated ganglioside derivative is an amount between abut 1 µg and abut 200 µg, the amount of the saponin is an amount between about 10 µg and about 200 µg, and the GM2 or GD2:Keyhole Limpet Hemocyanin derivative molar ratio is from 200:1 to 1400:1, the relative amounts of such conjugate and such saponin being effective to stimulate or enhance production in a subject to an antibody to GM2 and GD2, whichever is present as a derivative in the conjugate,

wherein in the conjugate the ganglioside derivative is covalently bound to the derivative of Keyhole Limpet Hemocyanin through a C-4 carbon of the altered sphingosine base of the altered ceramide portion of the ganglioside derivative to an ε-aminolysyl group of Keyhole Limpet Hemocyanin, wherein the C-4 carbon is present in a CH2 group, so as to thereby stimulate or enhance production of the antibody to GM2 and GD2 in the subject, whichever is present as a derivative in the conjugate. --

--115. (Currently amended) A method of treating a human subject having cancer ~~cancer in a subject~~ which comprises administering to the subject an effective cancer-treating amount of a composition which comprises:

a) a conjugate ~~comprising~~ of (i) a GM2 or a GD2 ganglioside derivative, which derivative comprises an unaltered oligosaccharide part and an altered ceramide portion comprising an altered sphingosine base and (ii) a derivative of Keyhole Limpet Hemocyanin;
b) QS-21, a saponin derivable from the bark of a Quillaja saponaria Molina tree; and
c) a pharmaceutically acceptable carrier;

wherein the amount of the conjugated ganglioside derivative is an amount between about 1 µg and about 200 µg, the amount of the

saponin is an amount of between abut 10 µg and about 200 µg, and the GM2 or GD2:Keyhole Limpet Hemocyanin derivative molar ratio is from 200:1 to 1400:1, the relative amounts of such conjugate and such saponin being effective to stimulate or enhance production in a subject of an antibody to GM2 and GD2, whichever is present as a derivative in the conjugate;

wherein in the conjugate the ganglioside derivative is covalently bound to the derivative of Keyhole Limpet Hemocyanin through a C-4 carbon of the sphingosine base of the ceramide portion of the ganglioside derivative to an ε-aminolysyl group of Keyhole Limpet Hemocyanin, and wherein the C-4 carbon is present in a CD2 group, so as to thereby stimulate or enhance production of the antibody to GM2 and GD2 in the subject, whichever is present as a derivative in the conjugate. --

--116. (Previously presented) The method of claim 115, wherein the cancer is of epithelial origin. --

--117. (Previously presented) The method of claim 115, wherein the cancer is of neuroectodermal origin. --

--118. (Previously presented) The method of claim 117, wherein the cancer of neuroectodermal origin is a melanoma.--

--119. (Previously presented) The method of claim 114 or 115, wherein the administering is effected at two or more sites. --

--120. (Previously presented) The method of claim 119, wherein the administering is effected at three sites. --

--121. (Previously presented) The method of claim 114 or 115, wherein the composition is administered subcutaneously to said

subject. --

--122. (Previously presented) The method of claim 121, wherein the composition is administered to said subject at two-week intervals. --

--123. (Previously presented) The method of claim 121, wherein the composition is initially administered to said subject at weekly intervals. --

--124. (Previously presented) The method of claim 114 or 115, wherein the composition to be administered is prepared prior to administration to the subject by mixing the conjugate and the saponin. --

--125. (Previously presented) The method of claim 124, wherein the conjugate and the saponin are mixed on the day of administration to the subject. --

Claim 126 (Cancelled).